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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/511,291	10/14/2004	Martin J Edwards	GB02 0042 US	2229
••	7590 02/21/200 CTRONICS NORTH A	EXAMINER		
INTELLECTUAL PROPERTY & STANDARDS 1109 MCKAY DRIVE, M/S-41SJ SAN JOSE, CA 95131			CHOW, DOON Y	
			ART UNIT	PAPER NUMBER
,			2629	
SHORTENED STATUTOR	Y PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE	
3 MONTHS 02/21/2007		02/21/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

		A	Anuliaant(a)		
Office Action Summan		Application No.	Applicant(s)		
		10/511,291	EDWARDS, MARTIN J		
	Office Action Summary	Examiner	Art Unit		
		Dennis-Doon Chow	2629		
Period fo	The MAILING DATE of this communication a or Reply	appears on the cover sheet with	the correspondence address		
WHIC - Exte afte - If NC - Failt Any	HORTENED STATUTORY PERIOD FOR REF CHEVER IS LONGER, FROM THE MAILING ensions of time may be available under the provisions of 37 CFR r SIX (6) MONTHS from the mailing date of this communication. O period for reply is specified above, the maximum statutory peri- ure to reply within the set or extended period for reply will, by sta- reply received by the Office later than three months after the ma- ned patent term adjustment. See 37 CFR 1.704(b).	DATE OF THIS COMMUNICA 1.136(a). In no event, however, may a repl od will apply and will expire SIX (6) MONTH tute, cause the application to become ABAN	ATION. y be timely filed IS from the mailing date of this communication. IDONED (35 U.S.C. § 133).		
Status					
1) 又	Responsive to communication(s) filed on 14	October 2004.			
•—		his action is non-final.			
3)□					
	closed in accordance with the practice unde	r <i>Ex parte Quayle</i> , 1935 C.D. 1	11, 453 O.G. 213.		
Disposit	ion of Claims		•		
5)□ 6)⊠ 7)□	Claim(s) <u>1-10</u> is/are pending in the application 4a) Of the above claim(s) is/are with defined claim(s) is/are allowed. Claim(s) <u>1-10</u> is/are rejected. Claim(s) is/are objected to. Claim(s) are subject to restriction and	rawn from consideration.			
Applicat	ion Papers				
10)	The specification is objected to by the Examing The drawing(s) filed on is/are: a) a Applicant may not request that any objection to the Replacement drawing sheet(s) including the correct The oath or declaration is objected to by the	ccepted or b) objected to by ne drawing(s) be held in abeyance ection is required if the drawing(s)	e. See 37 CFR 1.85(a). is objected to. See 37 CFR 1.121(d).		
Priority (under 35 U.S.C. § 119				
12)□ a)	Acknowledgment is made of a claim for forei All b) Some * c) None of: 1. Certified copies of the priority docume 2. Certified copies of the priority docume 3. Copies of the certified copies of the priority docume application from the International Bure See the attached detailed Office action for a li	ents have been received. ents have been received in Appriority documents have been re eau (PCT Rule 17.2(a)).	olication No eceived in this National Stage		
Attachmer	• •				
2) 🔲 Notic 3) 🔯 Infor	ce of References Cited (PTO-892) ce of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO/SB/08) er No(s)/Mail Date	Paper No(s)/N	nmary (PTO-413) Mail Date rmal Patent Application		

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DETAILED ACTION

Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 1-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Wu et al. (2003/0048262).

Regarding to claims 1 and 7, Wu discloses an electronic device comprising a display panel (204, Fig. 2) having at least one substrate on which are formed display pixels defining a display area which information is displayed, the device further including a drive circuit for driving the pixels, and touch input means [0023] operable by a user to perform input functions, the touch input means comprising a plurality of touch elements which are spaced from the substrate of the display panel (Figs. 2 and 11) and a sensing circuit connected to the touch elements for sensing touching of the touch elements by a user [0023].

Wu does not explicitly disclose carrying both the drive circuit for the pixels and the sensing circuit of the touch input means are on the substrate. However, the examiner takes Official Notice that forming both a drive circuit and a sensing circuit, such as a drive circuit for display pixels and a sensing circuit of a touch input means, in a small electronic device is well known in the art. Therefore, it would have been obvious

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to one of ordinary skill in the art to integrate Wu's drive circuit and sensing circuit on the same substrate so that the size of the electronic device can be reduce.

Regarding to claim 2, Wu does not disclose using thin film circuits in the pixel drive circuit and the sensing circuit. However, the examiner takes Official Notice that using thin film circuits in a pixel drive circuit and a sensing circuit is well known in the art. It would have been obvious to one of ordinary skill in the art to use well known thin film circuits in Wu's pixel drive circuit and sensing circuit since Wu does not disclose how the pixel drive circuit and the sensing circuit are constructed.

Regarding to claim 3, Wu further discloses the electronic device includes a housing that surrounds the display area of the display panel, and the touch elements are located in the housing (Figs. 2 and 11).

Regarding to claim 4, Wu further discloses the display panel forms part of a display module which includes a frame in which the display panel is carried, and wherein the touch elements are mounted to the frame of the display module (Figs. 2 and 11).

Regarding to claim 5, Wu further discloses the sensing circuit is responsive to a due to a user touching the touch change in capacitance at a touch element [0023].

Regarding to claim 6, Wu further discloses the sensing circuit is responsive to a change in resistance at a touch element resulting from a user touching the touch element [0023].

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Regarding to claim 8, Wu further discloses the touch elements are arranged in one or more arrays extending adjacent one or more sides of the display panel (Figs. 2 and 11).

Regarding to claim 9, Wu further discloses the sensing circuit is responsive to touching of touch elements to control scrolling of information displayed in the display area [0023].

Regarding to claim 10, Wu does not explicitly disclose the display panel is an active matrix display panel. However, the examiner takes Official Notice that active matrix display panel is old and well known in the art. It would have been obvious to one of ordinary skill in the art to use an active matrix display panel as the display panel in Wu device because the active matrix display panel displays better image than the passive matrix display panel.

Conclusion

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dennis-Doon Chow whose telephone number is 571-272-7767. The examiner can normally be reached on 8:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Sumati Lefkowitz can be reached on 571-272-3638. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Dennis-Doon Chow Primary Examiner Art Unit 2629

D. Chow February 16, 2007